

NPR-4RPHA

4" Pearl LED Round Adjustable Pinhole Retrofit

Source: 12W LED

800lm or 1000lm

Type

Project

Catalog No.

Notes

PRODUCT DESCRIPTION

Pearl LED Retrofit series is cULus classified for use in existing IC housings manufactured by Nora. The 4" retrofit luminaires deliver up to 800 lumens with 2" pinhole to focus the beam spread through small opening. Available in fixed downlight or adjustable.

FEATURES

- 1000lm LED output (800lm with Comfort Dim)
- Cree® LED COB or Comfort Dim Technology
- 2700K, 3000K, 3500K, 4000K @ 90+ CRI
- Field changeable optics included (Spot, Narrow Flood and Flood - installed)
- Integral dimmable driver
- 5-year limited warranty
- ENERGY STAR certified
- cULus classified for damp locations

SPECIFICATION

Construction: Reflectors are constructed of heat dissipating, die-cast aluminum. The aluminum die-cast LED heat sink is threaded to fit the reflector and transfer heat.

Mounting: Reflector includes friction blades to mount securely to housing.

OPTICS

Each reflector includes field changeable optics (27° spot, 35° narrow flood and 45° flood - preinstalled). Premium 15° and 25° TIR optics are also available.

ELECTRICAL

Input Voltage: 120V

Lumens / Wattage: 1000lm / 12W (800lm w/ Comfort Dim)

Color Temperature: 2700K, 3000K, 3500K, 4000K

CRI: 90+CRI

Operating Temp.: 0°C to 25°C ambient temperature

Lifetime: 50,000 hours @ L70

Comfort Dim: Comfort Dim color tunes the temperature from a bright 3100K, to a romantic and comfortable 2000K on a gradual, even curve. Available in 800lm only.

Dimming: Triac or ELV

[Click Here](#) or check complete dimmer list at www.NoraLighting.com in the "Compatibility" page under "Resources" tab

COMPATIBLE HOUSING

Pearl adjustable pinhole retrofit reflectors are compatible with 4" Max. Adjustability IC housing by Nora only.

New Construction

NSIC-4LMRAT Max. Adjustability ICAT Dedicated LED

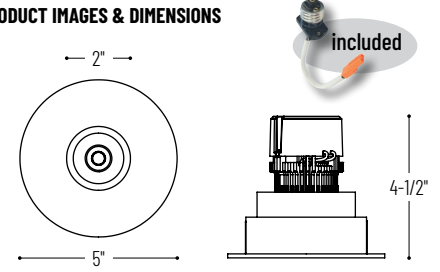
Accessories: Reflectors will accommodate (1) hex louver and (1) translucent deco collar or opaque snoot, no accessory holder is required, see accessories page.

LABELS AND LISTINGS

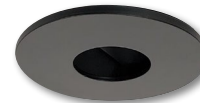
- cULus classified for Damp Locations
- ENERGY STAR certified
- RoHS compliant
- [5-Year Limited Warranty](#)
- Certified to the high efficacy requirements of California Title 24 JA8-2019



PRODUCT IMAGES & DIMENSIONS



NPR-4RPHA
Round Adjustable Pinhole
Adjustability: 20°



BB
Black Pinhole
Black Flange



BMPW
Black Pinhole
Matte Powder White Flange



HZMPW
Haze Pinhole
Matte Powder White Flange



MPW
Matte Powder White Pinhole
Matte Powder White Flange



WW
White Pinhole
White Flange

4" Pearl LED Round Adjustable Pinhole Retrofit

Reflector Type	Color Temperature / Lumens	Finish
NPR-4RPHA = Round Adjustable Pinhole	27X = 2700K / 1000lm	BB = Black / Black
	30X = 3000K / 1000lm	BMPW = Black / Matte Powder White
	35X = 3500K / 1000lm	HZMPW = Haze / Matte Powder White
	40X = 4000K / 1000lm	MPW = Matte Powder White
	CDX = Comfort Dim / 800lm	WW = White

Example: **NPR-4RPHA27XWW** = 4" Pearl LED Round Adjustable Pinhole Retrofit, 2700K / 1000lm, White finish

Pearl LED Retrofit Accessories

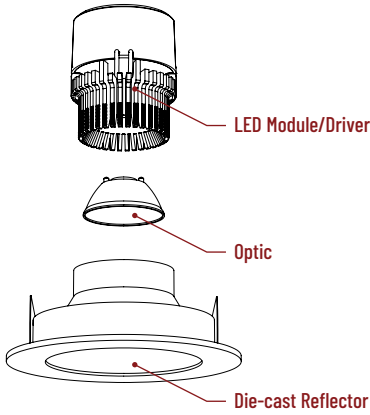
4" Pearl LED Round Adjustable Pinhole Retrofit

Type	
Project	
Catalog No.	
Notes	

FIELD CHANGEABLE OPTICS

Pearl reflectors include spot, narrow flood and flood optics. Optics can be changed in the field by removing LED module from die-cast reflector. Replacement optics include an optional frosted lens.

Note: Premium TIR optics are not compatible with Comfort Dim LED modules.



Frosted Filter-Optic

NIO-REFL15FR	15° Optic
NIO-REFL25FR	27° Optic
NIO-REFL38FR	35° Optic
NIO-REFL60FR	45° Optic

Optic assemblies includes specified optic and optional frosted lens. 27°, 35° and 45° optics are included with each reflector.



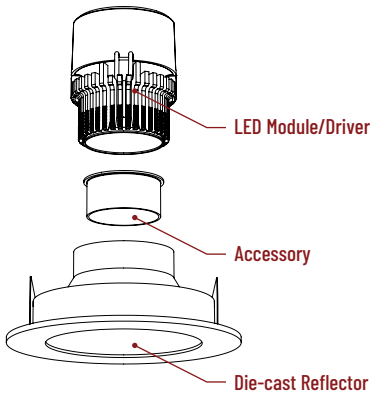
Premium TIR Optics

NIO-REFLTIR15	15° Optic
NIO-REFLTIR25	25° Optic

Premium TIR (total internal reflection) optics create optimal spot and narrow flood beam spread.
Not compatible with Comfort Dim (CDX) LED module

ACCESSORIES

Pearl accessories can be added at any point in the design process. Accessories easily install between LED module and die-cast reflector. Luminaire will accommodate (1) hex louver and (1) collar accessory, no accessory holder required.



Translucent Decorative Collar

NIO-AS14(color)	5/8" length
NIO-AS19(color)	3/4" length
NIO-AS26(color)	1" length
Color:	
AM (amber), BLU (blue), FR (frosted), R (red)	

Translucent collars color the aperture with the specified color while producing white general light. Collars are available in different lengths. Use to add interest, create a theme, match a theme or define a space.



Opaque Collar Snoot

NIO-AS14(color)	5/8" length
NIO-AS19(color)	3/4" length
NIO-AS26(color)	1" length
Color:	
BLK (black), MPW (matte powder white), WH (white)	

Opaque snoot greatly reduces aperture brightness while preserving light output. (Note: Black snoot will reduce light)



Hex Cell Louver

NIO-HC	Black
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Hex cell louver subtly reduces aperture brightness by reducing light output by about 20%.

PHOTOMETRICS

4" Pearl LED Round Adjustable Pinhole Retrofit

Type

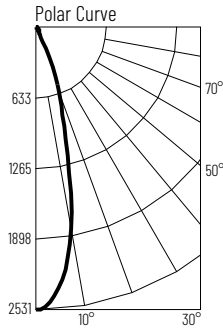
Project

Catalog No.

Notes

Test Information

Test Number: NTR1545
 Part Number: NPR-4RPHA30XWW
 Beam Spread: 27° Spot
 Lumens: 747lm
 Wattage: 11.65W
 Efficacy: 64pw
 CCT / CRI: 3000K / 90 CRI
 Spacing Criteria (0°-180): 0.46
 Spacing Criteria (90°-270): 0.46



Illuminance at a Distance

Distance from Luminaire	FC at Nadir	Beam Diameter
4'	158fc	1'-11"
6'	70.2fc	2'-11"
8'	39.5fc	3'-10"
10'	25.3fc	4'-10"
12'	17.6fc	5'-10"

Zonal Lumen Summary

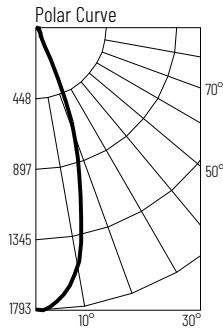
Zone	Lumens	% Luminaire
0-30	616	82.5
0-40	652	87.3
0-60	703	94.1
0-90	744	99.7
90-180	2	0.3
0-180	747	100

Candela Table

Vertical Angles	Candela
0	2528
5	2335
15	1031
25	213
35	56
45	35

Test Information

Test Number: NTR1546
 Part Number: NPR-4RPHA30XWW
 Beam Spread: 35° Narrow Flood
 Lumens: 730lm
 Wattage: 11.69W
 Efficacy: 62pw
 CCT / CRI: 3000K / 90 CRI
 Spacing Criteria (0°-180): 0.58
 Spacing Criteria (90°-270): 0.58



Illuminance at a Distance

Distance from Luminaire	FC at Nadir	Beam Diameter
4'	112fc	2'-7"
6'	49.6fc	3'-10"
8'	27.9fc	5'-1"
10'	17.9fc	6'-5"
12'	12.4fc	7'-8"

Zonal Lumen Summary

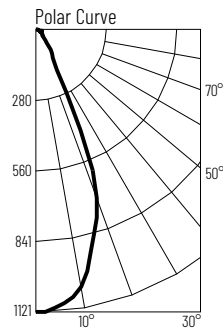
Zone	Lumens	% Luminaire
0-30	598	81.9
0-40	630	86.2
0-60	685	93.8
0-90	728	99.7
90-180	2	0.3
0-180	730	100

Candela Table

Vertical Angles	Candela
0	1787
5	1715
15	1098
25	259
35	54
45	35

Test Information

Test Number: NTR1547
 Part Number: NPR-4RPHA30XWW
 Beam Spread: 45° Flood
 Lumens: 690lm
 Wattage: 11.65W
 Efficacy: 59pw
 CCT / CRI: 3000K / 90 CRI
 Spacing Criteria (0°-180): 0.76
 Spacing Criteria (90°-270): 0.76



Illuminance at a Distance

Distance from Luminaire	FC at Nadir	Beam Diameter
4'	70.1fc	3'-4"
6'	31.1fc	5'
8'	17.5fc	6'-7"
10'	11.2fc	8'-4"
12'	7.8fc	9'-11"

Zonal Lumen Summary

Zone	Lumens	% Luminaire
0-30	516	74.8
0-40	582	84.3
0-60	640	92.8
0-90	688	99.7
90-180	2	0.3
0-180	690	100

Candela Table

Vertical Angles	Candela
0	1121
5	1097
15	874
25	357
35	103
45	39

Lumen Output Multipliers

Color Temperature: 2700K (0.97), 3000K (1.00), 3500K (1.05), 4000K (1.09)